

**Amendments to Claims**

This listing of claims will replace all prior versions and listing of claims in the application:

**Listing of Claims**

1. (Original) A fluid analyzer comprising:
  - a pre-concentrator having a plurality of parallel channels; and
  - a concentrator connected to the pre-concentrator; and
  - a first separator connected to the concentrator.
2. (Original) The analyzer of claim 1, further comprising a first plurality of heater elements situated in the concentrator.
3. (Original) The analyzer of claim 2, further comprising a second separator connected to the first separator.
4. (Original) The analyzer of claim 3, further comprising a second plurality of heater elements in the channels of the pre-concentrator.
5. (Original) The analyzer of claim 4, further comprising a controller connected to the first and second pluralities of heater elements for providing a concentrated heat pulse.
6. (Previously Presented) The analyzer of claim 5, further comprising a first pump connected to the pre-concentrator.
7. (Original) The analyzer of claim 6, further comprising a second pump connected to the second separator.

8. (Original) The analyzer of claim 7, further comprising at least one detector situated between an input of the pre-concentrator and the second pump.

9. (Original) The analyzer of claim 8, wherein the concentrated heat pulse moves through the concentrator.

10-20. (canceled)

21. (Previously Presented) A fluid analyzer comprising:  
a pre-concentrator having a plurality of parallel channels;  
a concentrator connected to the pre-concentrator;  
a first separator connected to the concentrator; and  
a controller connected to the pre-concentrator, the concentrator, and the first separator, the controller configured to activate and de-activate the pre-concentrator, concentrator, and first separator independently.

22. (Previously Presented) The fluid analyzer of claim 21, further comprising a first pump connected to the pre-concentrator.

23. (Previously Presented) The fluid analyzer of claim 22, further comprising a second pump connected to the second separator.

24. (Previously Presented) The fluid analyzer of claim 23, wherein the controller is connected to the first and second pumps, wherein the controller is configured to operate the first and second pumps simultaneously or separately.

Application Serial No. 10/672,483  
Response to Office Action mailed December 8, 2006  
Amendment dated     , 2007

25. (Previously Presented) The fluid analyzer of claim 21, further comprising a plurality of heater elements in the pre-concentrator channels.

26. (Previously Presented) The fluid analyzer of claim 23, further comprising at least one detector disposed between an input of the pre-concentrator and the second pump.

27. (Previously Presented) A fluid analyzer comprising:  
a pre-concentrator having a plurality of parallel channels;  
a concentrator connected to the pre-concentrator;  
a first separator connected to the concentrator;  
a first plurality of heater elements in the channels of the pre-concentrator; and  
a controller connected to the heater elements, the controller configured to energize the heater elements in a time phased sequence .

28. (Previously Presented) The fluid analyzer of claim 27, further comprising a second plurality of heater elements situated in the concentrator.

29. (Previously Presented) The fluid analyzer of claim 27, further comprising a second separator connected to the first separator.

30. (Previously Presented) The fluid analyzer of claim 27, wherein the controller is connected to the second plurality of heater elements, wherein the controller is configured to energize the first and second pluralities of heater elements to provide a concentrated heat pulse.

31. (Previously Presented) The fluid analyzer of claim 27, further comprising at least one detector disposed between an input of the pre-concentrator and the second pump.